

AMENDMENT TO THE CLAIMS

The listing of claims will replace all prior versions and listings in the application.

Listing of Claims:

Claim 1 (Previously Presented) An apparatus for broadcasting an RF (radio frequency) signal comprised of analog FM frequency modulation) and digital signals and comprising:

a splitter that receives said analog FM signal for splitting said FM signal into a fractional portion and a remainder portion;

a summer for summing said fractional portion with said digital signal to provide a first combined signal;

a main FM transmitter for amplifying said remainder portion to provide an amplified FM signal;

a digital transmitter for amplifying said first combined signal to provide an amplified combined signal; and

a combiner that combines said amplified FM signal and said amplified combined signal to provide a said RF signal to be broadcasted.

Claim 2 (Currently Amended) An apparatus ~~as set forth in claim 1~~ for broadcasting an RF (radio frequency) signal comprised of analog FM frequency modulation) and digital signals and comprising:

a splitter that receives said analog FM signal for splitting said FM signal into a fractional portion and a remainder portion;

a summer for summing said fractional portion with said digital signal to provide a first combined signal;

a main FM transmitter for amplifying said remainder portion to provide an amplified FM signal;

a digital transmitter for amplifying said first combined signal to provide an amplified combined signal; and

further comprising a combiner that combines said amplified FM signal and said amplified combined signal to provide a said RF signal to be broadcasted, a phase adjuster located between said splitter and said summer for adjusting the phase of said fractional portion.

Claim 3 (Original)      An apparatus as set forth in claim 2 wherein said phase adjuster is manually adjustable.

Claim 4 (Previously Presented) An apparatus as set forth in claim 2 wherein said combiner is a signal coupler having a coupling coefficient in the range from about -3dB to about -9dB.

Claim 5 (Original)      An apparatus as set forth in claim 4 wherein said adjuster is manually adjustable.

Claim 6 (Original)      An apparatus as set forth in claim 2 wherein said combiner is a signal coupler

having a coupling coefficient on the order of around - 5dB.

Claim 7 (Original)      An apparatus as set forth in claim 6 wherein said adjuster is manually adjustable.

Claim 8 (Previously Presented) An apparatus as set forth in claim 1 wherein said digital signal is an IBOC inband on channel digital signal.

Claim 9 (Previously Presented) An apparatus for broadcasting an RF (radio frequency) signal comprised of analog FM frequency modulation) and digital signals and comprising:

    a splitter that receives a said analog FM signal for splitting said FM signal into a fractional portion and a remainder portion;

    a summer for summing said fractional portion with said digital signal to provide a first combined signal;

a main FM transmitter for amplifying said remainder portion to provide an amplified FM signal;

a digital transmitter for amplifying said first combined signal to provide an amplified combined signal; and

said digital signal is an IBOC inband on channel digital signal including a phase adjuster located between said splitter and said summer for adjusting the phase of said fractional portion.

Claim 10 (Original) An apparatus as set forth in claim 9 wherein said adjuster is manually adjustable.

Claim 11 (Previously Presented) An apparatus as set forth in claim 9 wherein said combiner is a signal coupler having a coupler coefficient on the order of about -3dB to about -9dB.

Claim 12 (Original) An apparatus as set forth in claim 11 wherein said adjuster is manually adjustable.

Claim 13 (Previously Presented) An apparatus as set forth in claim 9 wherein said combiner is a signal coupler having a coupling coefficient on the order of about -5dB.

Claim 14 (Original) An apparatus as set forth in claim 13 wherein said adjuster is manually adjustable.

Claim 15 (Previously Presented) An apparatus for broadcasting an RF (radio frequency) signal comprised of analog FM (frequency modulation) and digital signals comprising:

a splitter that receives a said FM signal for extracting a fractional portion of said FM signal;

a summer for summing said fractional portion and said digital signal to provide a first combined signal;

a main FM transmitter amplifying a remainder portion of said FM signal less said fractional portion and provides an amplified FM signal;

a digital transmitter for amplifying said first combined signal to provide an amplified combined signal; and

a combiner that combines said amplified FM signal and said amplified combined signal to provide a said RF signal to be broadcasted.

Claim 16 (Previously Presented)      A method for broadcasting an RF (radio frequency) signal comprised of analog FM (frequency modulation) and digital signals including the steps of:

receiving said analog FM signal;

receiving said digital signal;

extracting a fractional portion of said FM signal;

summing said fractional portion with said digital signal to provide a first combined signal;

amplifying the FM signal portion remaining after said fractional portion has been extracted to provide an amplified FM signal;

amplifying said first combined signal to provide an amplified combined signal; and

combining said amplified FM signal with said amplified combined signal to provide said RF signal to be broadcasted.

Claim 17 (Previously Presented) A method as set forth in claim 16 further comprising the step of adjusting the phase of said fractional portion.

Claim 18 (Previously Presented) A method as set forth in claim 17 further comprising the step of manually adjusting the phase of said fractional portion.



Claim 19 (Original) A method as set forth in claim 16, wherein said digital signal is an IBOC signal.

Claim 20 (Previously Presented) A method as set forth in claim 19 further comprising the step of adjusting the phase of said fractional portion.